KITTING PROCEDURE

RFID MODULE UHF-CA3-G2

Author: Philippe PORTE
File: Kitting Procedure UHF-CA3-G2 KIT A00388 A20.doc
Date: 19/02/08
Pages: 16
Reference: KIT A00388 A20

Revision	Date	Prepared by	Verified by	Validated by
A20	19/02/08	Philippe PORTE	Nicolas FORNIER	Pierre BONNEFOY

PSION TEKLOGIX
Printing date: 08/11/2010 16:58:00

CONTENTS

1. SCOPE OF DOCUMENT

This document describes the Kitting procedure.

This document is only for people implicated in the project, and is strictly confidential.

2. TERMINOLOGY

3. UPDATING OF DOCUMENT

Version	Evolutions	Author	Date
A00	Creation	Philippe PORTE	19/02/08
A10	6.2 Demo Configuration Select power 500 mW instead of 50 mW. 6.4 Check the reading Performance at 500 mW + Test of reading with a tag located on the ceiling.	Fabien BARRY	08/04/09
A20	Add Lock RF procedure	Jan-Manuel COLLOMBON	12/01/10

4. ENVIRONMENT

4.1. Documents and reference elements

Document	Reference	Version	Date

4.2. Environment

5. MOUNTING PROCEDURE

Kitting procedure for the product:

- RFID MODULE UHF-CA3-A1

5.1. Mounting procedure

There are two possibilities of delivery:

- WAP G2 configuration: The RFID module is installed in the WAP G2.
- Accessory: The RFID module is delivery like an accessory in a gift box.

5.1.1. WAP G2 configuration delivery

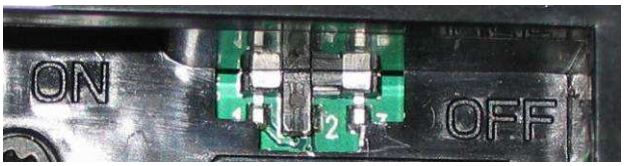
Before installing a module in the WORKABOUT PRO G2, all power sources must be turned off.

- Remove the batteries. If your unit is using AC power, disconnect it.

WAP C G2

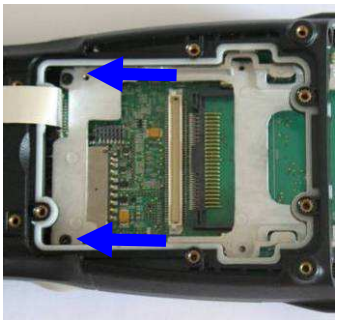
WAP S G2

- Slide the switch to position OFF to shut off internal battery power.



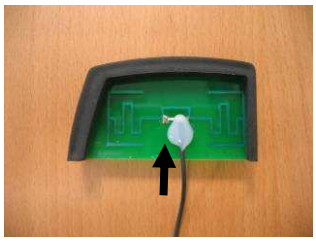
With the power shut down, you can install the RFID Module UHF-CA3-A1-G2.

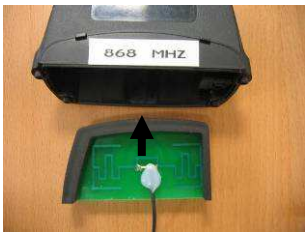
- Remove and discard the two screws on the bottom of the metal frame.

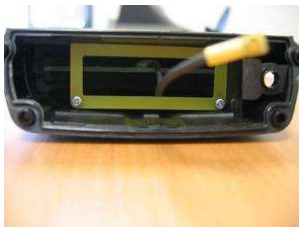


- Put the RFID Coupler UHF-CA3 in the same alignment of the expansion connector on the WORKABOUT PRO G2. Apply slight pressure to snap the module into place on the hand-held.
- Use four new screws (M2 x 6 mm) provided to secure the module in place.

- Slide the PCB guide in the Multi purpose End Cap.
- Slide the RFID Antenna in the PCB guide.
- Put the coaxial cable in the middle of the stopper and screw it.







- Connect the RFID Antenna UHF-A1 to the RFID Coupler UHF-CA3.

- Slide the switch to the position ON to turn power back on.
- Replace the end-cap, back plate and batteries.

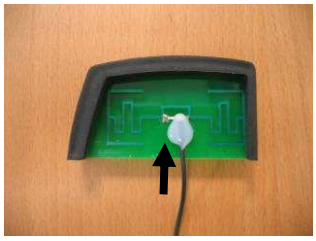
5.1.2. Accessory delivery

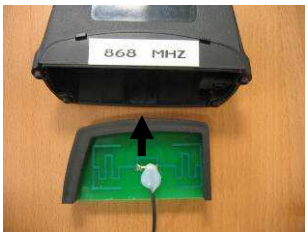
The RFID Module UHF-CA3-A1 is delivery in a gift box with:

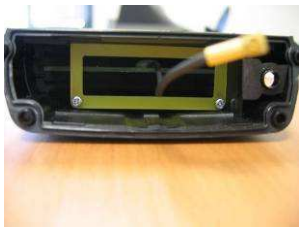
- 1 x RFID Coupler UHF-CA3 (in bull pack bag)
- 1 x RFID Antenna UHF-A1 (in bull pack bag)
- 1 x Expansion module instruction UHF CA3 A1 DPD A00386 A00
- 1 x Plastic bag with 4 screws M2 x 6mm + 4 screws M2.6 x 8 mm

Antenna mounting procedure:

- Slide the PCB guide in the Multi purpose End Cap.
- Slide the RFID Antenna in the PCB guide.
- Put the coaxial cable in the middle of the stopper and screw it.







6. LOCK RF

This application allows locking the radio frequency on the CAEN reader A528 according to the country and the band of frequencies where it has to run.

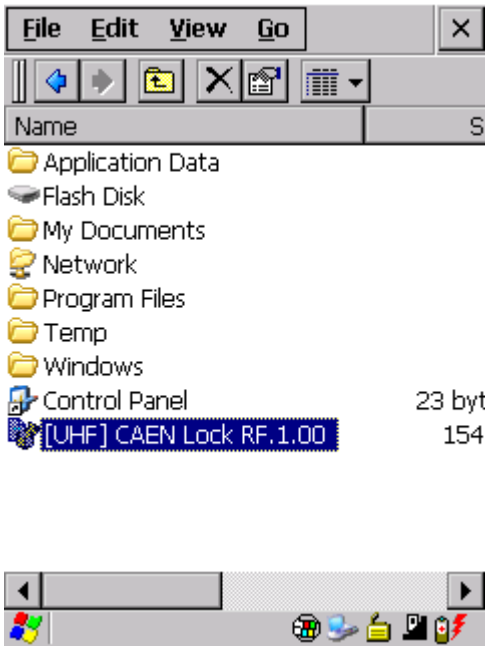
6.1. Lock RF installation

Important note: This application has **not** to be installed directly on the device, it will be used through an USB memory stick.

Important note 2: The installation has to be done once. After, we will use the CAEN Lock RF application directly through the USB memory stick.

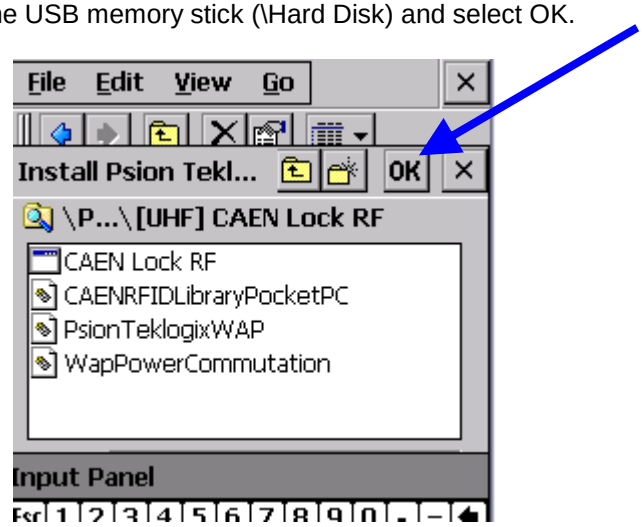
If installation was already done, please refer to the 6.2 point.

Copy the installation CAB file named “[UHF] CAEN Lock RF.vX.XX.CAB” on the WAP.



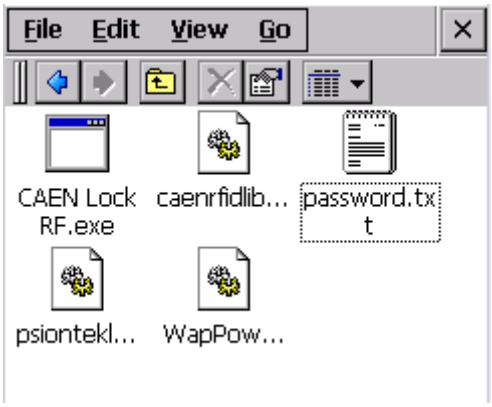
- Double tap on the file to start installation.

- Navigate to the USB memory stick (\Hard Disk) and select OK.



- After installation, CAEN Lock RF is available in "\Hard Disk\[UHF] CAEN Lock RF".

- Then, you have to copy "password.txt" file in the "CAEN Lock RF" folder (application folder) like the below picture.



- Now, your USB memory stick is up to date to lock the RF for each CAEN reader in serial.

6.2. Launch

- When the reader is integrated in the Workabout Pro, you have to plug the device in the docking station where the USB memory stick is located. From explorer, go to "\Hard Disk\[UHF] CAEN Lock RF" to execute the CAEN Lock RF application.

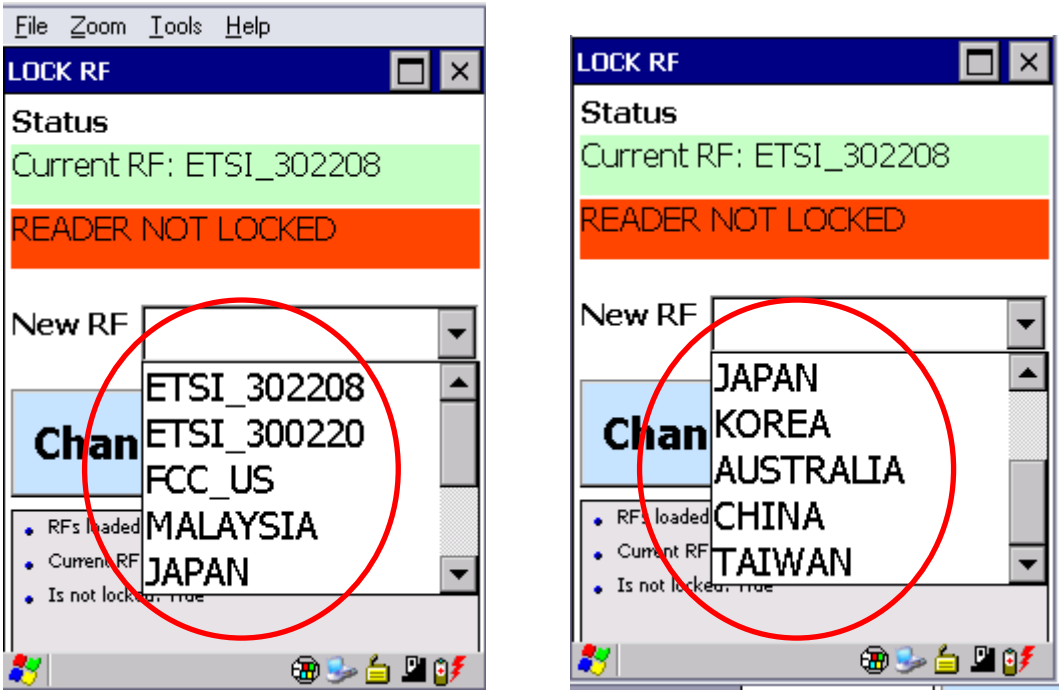
6.3. Use

6.3.1. Invalid firmware version is displayed

- If an error is displayed saying the firmware version is not valid. You have to upgrade the firmware using the “CAEN FW Upgrade” application. Please refer to the CAEN FW upgrade user manual for more information or ask to RFID Solutions team.

6.3.2. Normal use

- Select in the combo list, the radio frequency (RF) according to the country where the mobile will be sold.

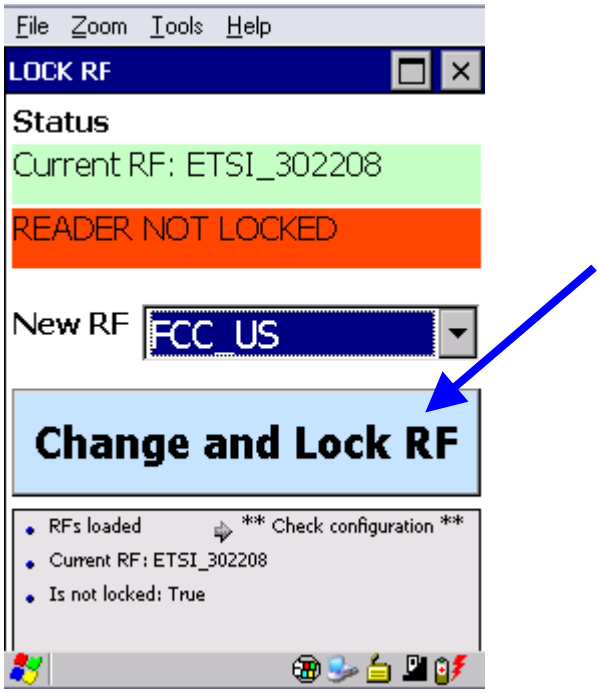


Refer to the below array to know which value to lock.

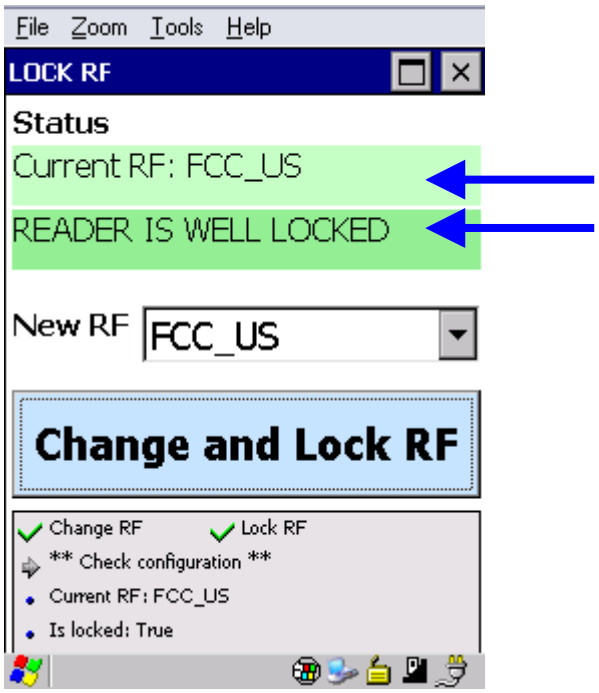
BAAN Item	Country of use	RF Regulation to lock
1051555	Europe	ETSI_302208 **(always used as default, excepted specific notification in the order)**
1051615	Japan	JAPAN
1051585	Nord America (USA / Canada)	**FCC_US (used as default, excepted for countries listed below or specific notification in the order)**
	Korea	KOREA
	China	CHINA
	Taiwan	TAIWAN
	Singapore	SINGAPORE
	Thaïland	SINGAPORE

For any new country, please ask to RFID Solutions team.

- Press “Change and Lock RF” when you have selected the right RF.



- When it is finished. Please check if the current RF is the one desired and the CAEN reader is locked.

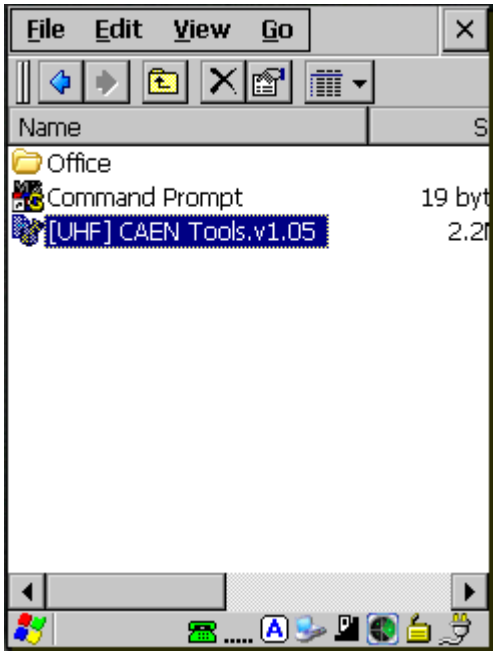


For any problem, refer to the USER MANUAL of CAEN Lock RF application or ask to RFID solutions team.

7. TEST PROCEDURE

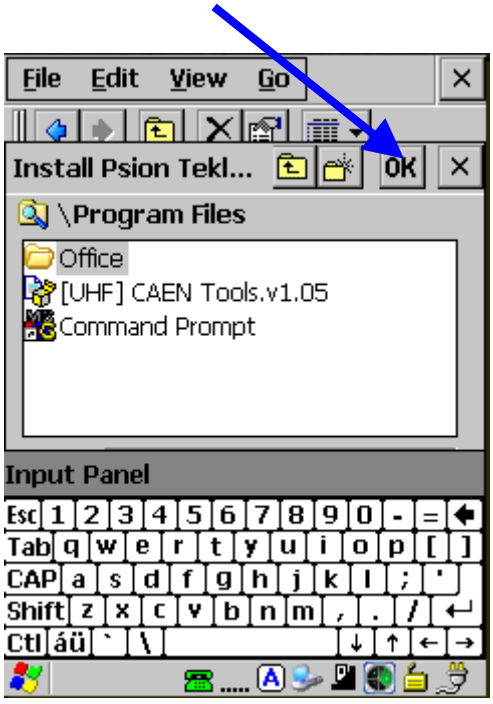
7.1. Demo software installation

- Copy the installation CAB file named "[UHF] CAEN Tools.vX.XX.CAB" on the WAP. Refer to User Manuel for details on how to copy file from PC to WAP (ActiveSync, Memory Card, …).
  Note: The CAB file will be automatically erased if file settings are not set to read-only before executing the file.

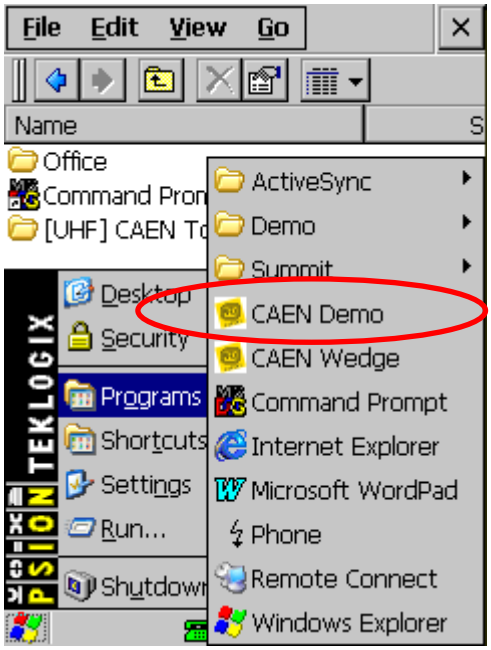


- Double tap on the file to start installation.

- Select OK.

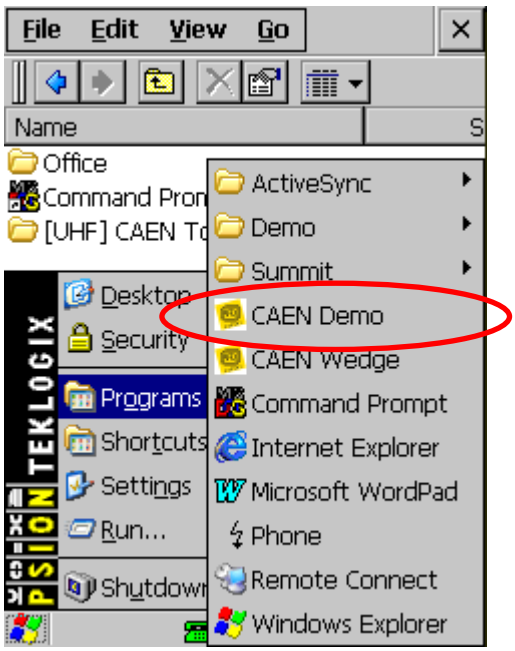


- After installation, CAEN Demo and CAEN Wedge are available in Programs.

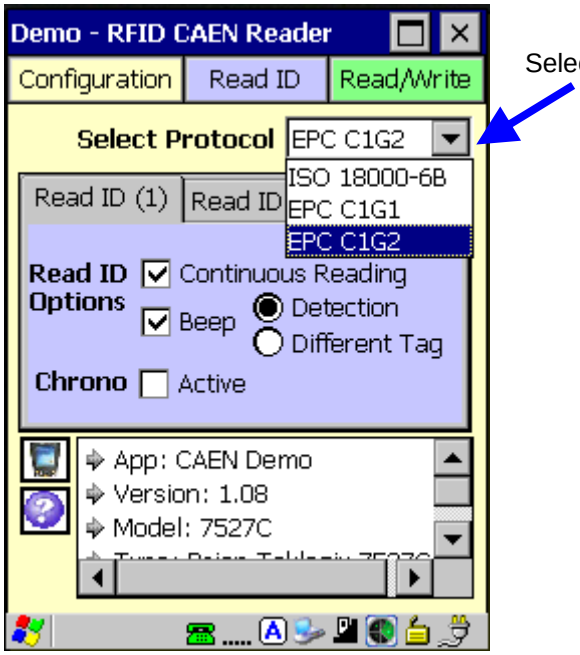


7.2. Demo Configuration

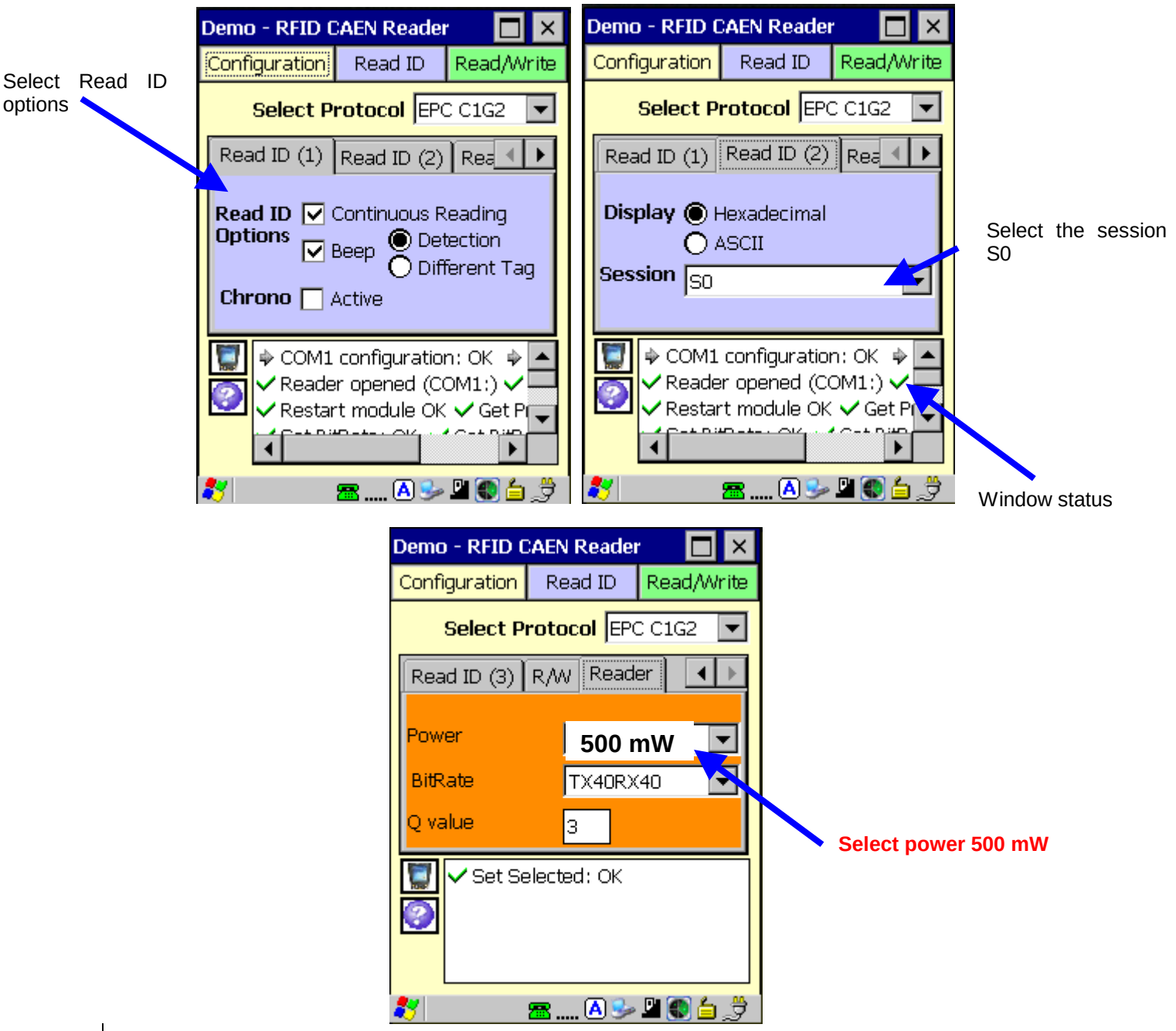
- Select “CAEN Demo” in Programs.



- To configure CAEN Demo, select the configuration tab.

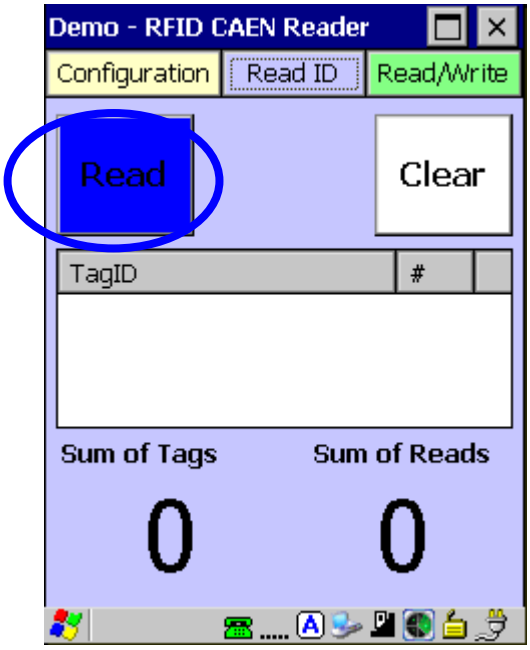


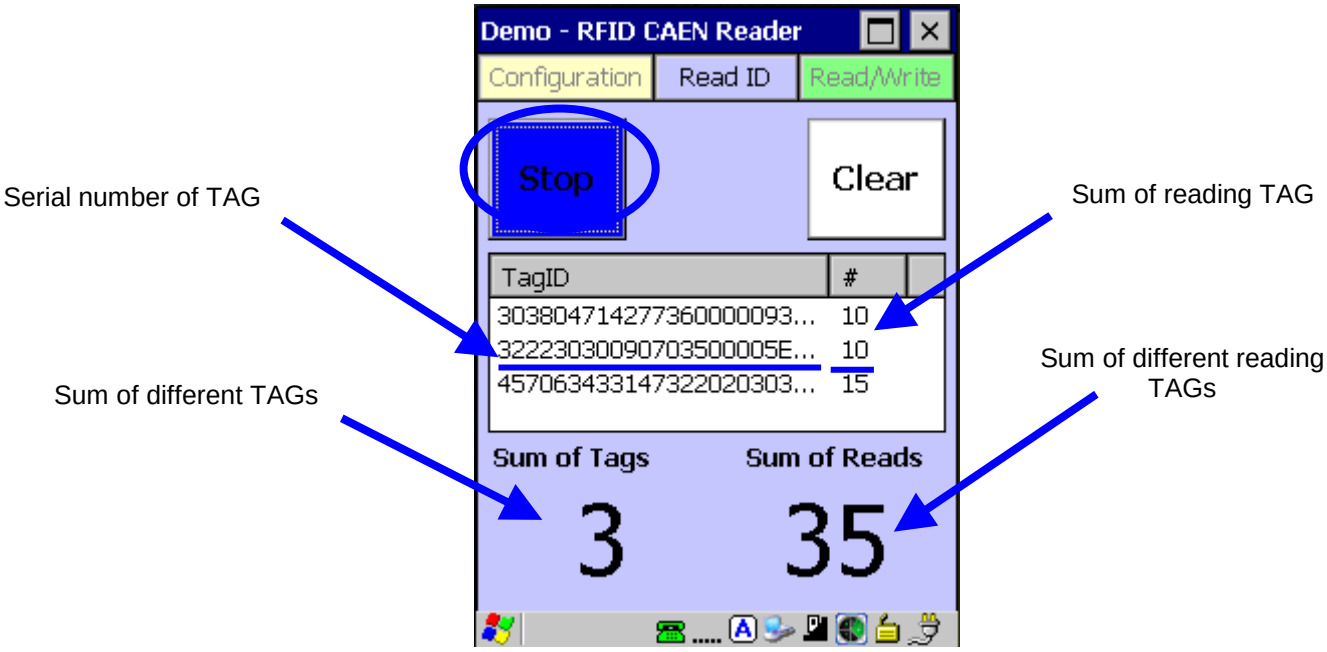
Select the protocol EPC C1G2



7.3. Read ID

- To read the ID of a TAG, select Read tab and press the button Read. Put the TAG in front of the antenna (on the side of the back plate).


Demo - RFID CAEN Reader
Configuration
Read ID
Read/Write
Read
Clear
TagID
#
Sum of Tags
Sum of Reads
0
0


Demo - RFID CAEN Reader
Configuration
Read ID
Read/Write
Stop
Clear
TagID
#
3038047142773600000 93...
10
3222303009070350000 5E...
10
4570634331473220203 03...
15
Sum of Tags
Sum of Reads
3
35
Serial number of TAG
Sum of reading TAG
Sum of different TAGs
Sum of different reading TAGs

7.4. Check the Reading performances

Use Read ID option in RFID demonstration to check the reading performances with the reference TAG “ETALON UHF-CA3-Ax” (Dogbone Tag from UPM Raflatac) and a **500 mW** RF power.

The ID number of Tag is 111111111111111111111111.

Put the tag in the horizontal position and check that the reading is correct and fast.

For RFID Module UHF-CA3-A1 the reading distance is around 150 - 175 cm